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| 09/767,863 | 01/24/2001 | Hirotake Nozaki | 108414 | 8835 |

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| EXAMINER |
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MISLEH, JUSTIN P

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| ART UNIT | PAPER NUMBER |
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2612

DATE MAILED: 05/05/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/767,863

Applicant(s)

NOZAKI, HIROTAKE

Examiner

Justin P. Misleh

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 06 December 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7 and 9-18 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 9 - 18 is/are allowed.
- 6) ☒ Claim(s) 1 - 7 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 01 May 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Response to Arguments

1. Applicant's arguments with respect to Claim 1 – 7 have been considered but are moot in view of the new grounds of rejection.
2. Applicant's amendments to the specification are approved and accepted; however, Applicant's amendment to the title is insufficient to overcome the objection. (please see below).

Specification

3. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

The following title is suggested: "Multi-Point Auto-Focus Digital Camera Including Electronic Zoom".

Claim Rejections - 35 USC § 102

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. **Claims 1 – 6** are rejected under 35 U.S.C. 102(b) as being anticipated by Kaji.

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6. For **Claim 1**, Kaji discloses, as shown in figures 1, 2, and 5 and as stated in columns 4 (lines 8 – 67), 5 (lines 1 – 3), and 6 (line 23) – 7 (line 14), a multi-point auto-focus digital camera, comprising:

an image-capturing element (2) that receives an image through a photographic lens (1) and outputs an image signal corresponding to the image;

a focal point detection device (gate circuit 20 and AF signal processing circuit 21) that detects a focal point adjustment state of the photographic lens (1) in each focal point detection region of a plurality of focal point detection regions (“focus detection regions” – see column 7, lines 1 – 14) set inside a photographic field based on the image signal outputted from the image-capturing element (also see column 4, lines 57 – 67 and column 5, lines 1 – 3);

an image trimming section (enlargement processing circuit 5) that trims part of the image signal to create a trimmed image signal (see figures 3 and 5 and column 5, lines 33 – 55);

a display device (EVF 12) that displays the image signal outputted from the image-capturing element and the trimmed image signal created by the image trimming section (see column 6, lines 23 – 43);

a region changing section (microcomputer 9) that changes the focal point detection regions according to a trimming range of the trimmed image signal (see column 6, lines 58 – 67, and column 7, lines 1 – 14); and

a focal point adjustment device (focus motor 14 and driver 15) that carries out focal point adjustment of the photographic lens (1) based on focal point detection results for the focal point detection regions that have been changed (see Steps S4 and S6 in figure 2).

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7. As for **Claim 2**, Kaji discloses the multi-point auto-focus digital camera according to Claim 1, wherein:

said region changing section (microcomputer 9) selects focal point detection regions according to the trimming range of the trimmed image signal (see column 6, lines 63 – 67, and column 7, lines 9 – 14).

The Examiner interprets that the microcomputer (9), in fact, “selects focal point detection regions” when the microcomputer (9) changes the sizes of the “focus detection areas” and sets positions of the “focus detection area”.

8. As for **Claim 3**, Kaji discloses the multi-point auto-focus digital camera according to Claim 1, wherein:

said region changing section (microcomputer 9) changes position of focal point detection regions according to the trimming range of the trimmed image signal (see column 6, lines 63 – 67, and column 7, lines 9 – 14).

The Examiner interprets that the microcomputer (9), in fact, “changes position of focal point detection regions” when the microcomputer (9) changes the sizes of the “focus detection areas” and sets positions of the “focus detection area”.

9. As for **Claim 4**, Kaji discloses the multi-point auto-focus digital camera according to Claim 1, wherein:

said region changing section (microcomputer 9) changes the size of focal point detection regions according to the trimming range of the trimmed image signal (see column 6, lines 63 – 67, and column 7, lines 9 – 14).

The Examiner interprets that the microcomputer (9), in fact, “changes the size of focal point detection regions” when the microcomputer (9) changes the sizes of the “focus detection areas” and sets positions of the “focus detection area”.

10. As for **Claim 5**, Kaji discloses, as shown in figures 3 and 5, the multi-point auto-focus digital camera according to Claim 1, wherein:

said image trimming section trims and enlarges central portions of the imaged picture, and creates an electronically zoomed image (see column 6, lines 63 – 67).

11. As for **Claim 6**, Kaji discloses, as shown in figures 3 and 5, the multi-point auto-focus digital camera according to Claim 1, wherein:

said image trimming section removes upper and lower parts of the imaged picture and trims central broad portions to create a pseudo wide image or a pseudo panoramic image (see column 5, lines 33 – 55).

Claim Rejections - 35 USC § 103

12. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

13. **Claim 7** is rejected under 35 U.S.C. 103(a) as being unpatentable over Kaji in view of Kodama.

14. As for **Claim 7**, Kaji discloses, as shown in figures 6, that a manual region selection focal point adjustment mode corresponds to the user's visual axis detection system (30 of figure 6)

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because the user's visual axis (i.e. gaze direction) selects an arbitrary enlargement region among an infinite enlargement regions (see figure 10) so as to carry out enlargement and focal point adjustment (see column 7, lines 54 – 67).

Kaji effectively and arbitrarily selects a focal point detection region from an infinite number of focal point detection regions when Kaji selects an enlargement region because adjustment of the focal point detection regions including selection, position, and size is dependent upon the enlargement region. However, Kaji does not disclose that a warning is issued if a focal point detection region that cannot be selected, because it is outside the trimming range, has been selected.

On the other hand, Kodama also discloses a multi-point auto-focus camera with manual region selection. More specifically, Kodama discloses a manual region selection focal point adjustment mode that corresponds to a user's visual axis detection system (18/19 of figure 9) because the user's visual axis (i.e. gaze direction) selects an arbitrary focal point detection region among a plurality of focal point detection regions (105L2, 105L1, 105C, 105R1, and 105R2) so as to carry out focal point adjustment (S513 of figure 10). Furthermore, Kodama discloses, as shown in figure 11, a warning (S607) is issued if a focal point detection region that cannot be selected, because it is outside the trimming range, has been selected.

As stated in column 2 (lines 27 – 60) of Kodama, at the time the invention was made, it would have been obvious to one with ordinary skill in the art to have provided a warning if a focal point detection region that cannot be selected, because it is outside the trimming range, has been selected, as taught by Kodama, in the multi-point auto-focus digital camera of Kaji, for the

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advantage of ensuring that object to be photographed has appropriate brightness such that accurate focus areas can be set and preventing unnecessary focus areas from being set.

Cited Prior Art

15. The prior art made of record and not relied upon is considered pertinent to Applicant's disclosure because each discloses a multi-point auto-focus digital camera including manual setting of electronic zooming and/or focus detecting regions.

Allowable Subject Matter

16. **Claims 9 – 18** are allowed. The following is a statement of reasons for the indication of allowable subject matter:

For **Claims 9 and 10**, the prior art (cited 29 May 2004) teaches in the very least automatic focusing and manual focusing both of which include setting a focus detection region(s) in a field of view. In automatic focusing, the focus detection region(s) in the field of view are varied by position and/or size to obtain an optimal focus detection region. Thus, the optimal focus detection region(s) is brought into focus and the entire field of view is displayed accordingly. In manual focusing, the focus detection region(s) in the field of view are selected or varied by position and/or size manually by a user operating a switch of some sort. The user selects the focus detection region(s) of their choice. Thus, the selected focus detection region(s) is brought into focus and the entire field of view is displayed accordingly. In both the above-described automatic focusing and manual focusing, the field of view is superimposed with the focus detection region(s) and shown in combination in a viewfinder. The field of view is

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obtained from an image-taking lens and reflected by half-mirrors, mirrors, lenses, and prisms to an eye of the user and the focus detection region(s) is provided by an internal liquid crystal display.

In the prior art, variations exist wherein no viewfinder is provided and rather only a display or monitor is provided and the automatic focusing and/or manual focusing, as described above, can be performed by a user viewing the display or monitor. Furthermore, the prior art also discloses a camera comprised of a viewfinder and a display or monitor and when a user is looking into the viewfinder, the display or monitor is turned off, thereby preventing any camera control via the display or monitor. Lastly, the prior art discloses an electronic camera with both a manual focusing operation and an automatic focusing operation wherein an automatic focusing operation is automatically inhibited upon detection of a manual focusing operation performed by a user.

Therefore, in regards to the claim language, the prior art does not teach or fairly suggest, in the very least, a camera comprising an optical viewfinder through which a subject is looked, a monitor that displays a position of each of the focal point detection regions (of a plurality of focal point detection regions) superimposed on a subject image taken using image-capturing elements, a region selecting member that manually selects an arbitrary focal point detection region from within the plurality of focal point detection regions, a sensing section that senses a non-used state of said monitor; and a prohibiting section that prohibits manual selection of focal point detection regions by said region selection member when the non-used state of said monitor is detected.

Conclusion

17. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

Any inquiry concerning this communication or earlier communications from the Examiner should be directed to Justin P Misleh whose telephone number is 571.272.7313. The Examiner can normally be reached on Monday through Thursday from 7:30 AM to 5:00 PM and on alternating Fridays from 8:00 AM to 4:30 PM.

If attempts to reach the Examiner by telephone are unsuccessful, the Examiner's supervisor, Wendy R Garber can be reached on 571.272.7308. The fax phone number for the organization where this application or proceeding is assigned is 703.872.9306.


Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

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applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

JPM

April 22, 2005


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